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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/972,178	10/09/2001	Hanae Shimokawa	500.38665CX1	5052

20457 7590 02/04/2004

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EXAMINER

ZIMMERMAN, JOHN J

ART UNIT PAPER NUMBER

1775

DATE MAILED: 02/04/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Advisory Action

Application No.

09/972,178

Applicant(s)

SHIMOKAWA ET AL.

Examiner

John J. Zimmerman

Art Unit

1775

--The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

THE REPLY FILED 22 December 2003 FAILS TO PLACE THIS APPLICATION IN CONDITION FOR ALLOWANCE. Therefore, further action by the applicant is required to avoid abandonment of this application. A proper reply to a final rejection under 37 CFR 1.113 may only be either: (1) a timely filed amendment which places the application in condition for allowance; (2) a timely filed Notice of Appeal (with appeal fee); or (3) a timely filed Request for Continued Examination (RCE) in compliance with 37 CFR 1.114.

PERIOD FOR REPLY [check either a) or b)]

- a) ☒ The period for reply expires 5 months from the mailing date of the final rejection.
- b) ☐ The period for reply expires on: (1) the mailing date of this Advisory Action, or (2) the date set forth in the final rejection, whichever is later. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of the final rejection. ONLY CHECK THIS BOX WHEN THE FIRST REPLY WAS FILED WITHIN TWO MONTHS OF THE FINAL REJECTION. See MPEP 706.07(f).

Extensions of time may be obtained under 37 CFR 1.136(a). The date on which the petition under 37 CFR 1.136(a) and the appropriate extension fee have been filed is the date for purposes of determining the period of extension and the corresponding amount of the fee. The appropriate extension fee under 37 CFR 1.17(a) is calculated from: (1) the expiration date of the shortened statutory period for reply originally set in the final Office action; or (2) as set forth in (b) above, if checked. Any reply received by the Office later than three months after the mailing date of the final rejection, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

1. ☐ A Notice of Appeal was filed on _____. Appellant's Brief must be filed within the period set forth in 37 CFR 1.192(a), or any extension thereof (37 CFR 1.191(d)), to avoid dismissal of the appeal.
2. ☐ The proposed amendment(s) will not be entered because:
- (a) ☐ they raise new issues that would require further consideration and/or search (see NOTE below);
- (b) ☐ they raise the issue of new matter (see Note below);
- (c) ☐ they are not deemed to place the application in better form for appeal by materially reducing or simplifying the issues for appeal; and/or
- (d) ☐ they present additional claims without canceling a corresponding number of finally rejected claims.

NOTE: _____

3. ☐ Applicant's reply has overcome the following rejection(s): _____.
4. ☐ Newly proposed or amended claim(s) _____ would be allowable if submitted in a separate, timely filed amendment canceling the non-allowable claim(s).
5. ☒ The a) ☒ affidavit, b) ☐ exhibit, or c) ☒ request for reconsideration has been considered but does NOT place the application in condition for allowance because: See Continuation Sheet.
6. ☐ The affidavit or exhibit will NOT be considered because it is not directed SOLELY to issues which were newly raised by the Examiner in the final rejection.
7. ☐ For purposes of Appeal, the proposed amendment(s) a) ☐ will not be entered or b) ☐ will be entered and an explanation of how the new or amended claims would be rejected is provided below or appended.

The status of the claim(s) is (or will be) as follows:

Claim(s) allowed: _____.

Claim(s) objected to: _____.

Claim(s) rejected: _____.

Claim(s) withdrawn from consideration: _____.

8. ☐ The drawing correction filed on _____ is a) ☐ approved or b) ☐ disapproved by the Examiner.
9. ☐ Note the attached Information Disclosure Statement(s) (PTO-1449) Paper No(s). _____.
10. ☒ Other: Form PTO-1449 enclosed

John J. Zimmerman
Primary Examiner
Art Unit: 1775

(Continuation of 5.) does not place the application in condition for allowance because: The "Further Declaration Under 37 CFR 1.132" of Masahide Okamoto has been carefully considered, but left some unresolved issues in its attempt to prove new and unexpected results over the prior art Tanimoto reference. The examiner appreciates that applicant has gone through the trouble and expense in trying to respond to the issues in this prosecution. Unfortunately, applicant's comparison of a single Sn-2Bi layer to the comparison example of in Tanimoto where a layer of Sn-2Bi and Sn-10Bi is reflowed (thus also forming a single layer) creates the issue of whether the differences in soldered connection properties (e.g. bonding, wetting, etc. . .) are a result of the fact that Tanimoto uses reflowed SnBi dual layers and the applicant uses a single SnBi layer or whether the differences in properties are a result of the fact that the total bismuth content in the applicant's example layer and the Tanimoto example reflowed layer are different. Since the alloy composition of a layer is capable of affecting the bonding, wetting, etc. . . , properties of a soldered connection, this is a fair question that must be addressed in order to interpret applicant's results in the declaration. A better comparison in a declaration would use examples having the same total overall alloy composition (thus eliminating the possibility that the results are due to differences in overall alloy composition), but still attempt to show that applicant's specimen's have patentably distinct results over reflowed dual layer specimens as in Example 44 of Tanimoto.